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## 1-30. (CANCELED)

31. (CURRENTLY AMENDED) An interlacing device (10, 10') for use with a palletizing machine (1), which palletizes the interlacing device (10, 10') interlacing, with an interlacing material (12'), elongated products (2) that are to be deposited palletized in superimposed rows on at least one transport pallet (7), the interlacing device (10, 10') comprising:

at least one interlacing gantry (11, 11') comprising:

at least two upright posts having top ends and bottom ends, the top ends of the at least two upright posts are joined at a top by a cross-beam, which extends and the at least two upright posts and the cross-beam extending generally parallel to and along at least a portion of a length of the elongated products (2) when the elongated products (2) are being palletized, and the cross beam having a length greater than a length of the elongated products (2); and

at least one interlacing guide (20, 20'), carried by the cross-beam, for dispensing [[an]] the interlacing material (12') from at least one spool (12);

wherein the at least two upright posts and the cross-beam extend vertically above and over a gantry base structure (19), and at least a guide section of the gantry base structure (19) extends at least two fixed guide base sections (19') extend parallel to one another and substantially perpendicular to the cross-beam, the bottom end of each of the at least two upright posts engage one of the at least two fixed guide base sections (19') for facilitating movement of the cross-beam therealong and the interlacing device (10, 10') at least one interlacing gantry (11, 11') along the at least two fixed guide base sections (19'); the interlacing device (10, 10') also comprises and a drive mechanism, which is operated independently of operation of the palletizing machine (1) which palletizes the elongated products (2), the drive mechanism is connected to the interlacing gantry (11, 11') for displacing the interlacing gantry (11, 11'), within the palletizing machine (1) and relative to the base structure at least two fixed guide base sections (19'), between at least two alternate end positions so as to displace alternately such that the at least one interlacing guide (20, 20') is displaced in at least one interlacing plane (P) from one side to another side of the transport pallet (7), the at least one interlacing plane (P) [[that]] is essentially perpendicular to the palletized elongated products (2) from one side to another side of the transport pallet (7), when palletized, and the cross-beam.

32. (CURRENTLY AMENDED) The interlacing device according to claim 31, wherein the drive mechanism causes displaces the interlacing gantry (11, 11') to pivot alternately between the at least two alternate end positions at least once.

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33. (CURRENTLY AMENDED) The interlacing device according to claim 31, wherein the drive mechanism (14) causes displaces the interlacing gantry (11, 11') to move at least once in alternate translation.

34. (CURRENTLY AMENDED) The interlacing device according to claim 31, wherein the drive mechanism (14) is selected from the group comprising at least one of electric motors (15), hydraulic cylinders and pneumatic cylinders.

35. (CURRENTLY AMENDED) The interlacing device according to claim 34, wherein the drive mechanism (14) comprises at least one transmission system selected from the group comprising at least pinions and a chain (16), and a pulley and a belt.

36. (CURRENTLY AMENDED) The interlacing device according to claim 33 wherein the ~~gantry base structure (19)~~ comprises at least one chassis (19) equipped with the guide section which comprises guide means bottom ends of the at least two upright posts have integral rollers that roll along the at least two fixed guide base sections (19') for moving the interlacing gantry (11, 11') in a translational direction.

37. (CURRENTLY AMENDED) The interlacing device according to claim 36, wherein the ~~guide means~~ comprises at least one pathway (18) formed in the chassis (19) to receive rollers (17) integral with vertical the upright posts (11a) [[on]] of the interlacing gantry (11, 11') are guide wheels.

38. (CURRENTLY AMENDED) The interlacing device according to claim 31, wherein the interlacing gantry (11, 11') comprises at least two guides (20, 20') located on the ~~interlacing gantry (11, 11')~~ cross-beam to distribute at least two interlacing ties (12') in at least two essentially parallel interlacing planes (P) distributed along across the palletized length of the elongate products (2) when palletized.

39. (CURRENTLY AMENDED) The interlacing gantry according to claim 38, wherein at least one of the at least two guides (20') is associated communicates with activating means (21) which displace the at least one of the at least two guides (20') in alternate translation along the cross-beam of the interlacing gantry (11') for over a predetermined distance (D) to displace the interlacing plane (P) essentially parallel to itself laterally.

40. (CURRENTLY AMENDED) The interlacing device according to claim 39, wherein the activating means (21) is selected from the group comprising at least one of electric motors, hydraulic cylinders and pneumatic cylinders.

41. (CURRENTLY AMENDED) A palletizing machine (1) having an interlacing device (10, 10') for palletizing elongated cylindrical products (2), the palletizing machine (1) comprising:

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at least one upright palletizing gantry (3), at least one carrier (4) being movable in vertical translation supported by and vertically slideable along the at least one upright palletizing gantry (3), and at least one gripping device (5) being movable in supported by and horizontally slideable along translation on the at least one carrier (4) [[and]] to remove transfer the elongated cylindrical products (2) from a storage ramp (6) and deposit the products (2) on to a transport pallet (7);

at least one the interlacing device (10, 10') [[being]] is separate from the palletizing machine (1) and comprising comprises at least one interlacing gantry (11, 11') extending generally parallel to and along at least a portion of a length of the products (2), the interlacing gantry (11, 11') comprising, which comprises

at least one interlacing guide (20, 20') for supplying an interlacing material (12') from at least one spool (12); wherein the at least one interlacing gantry (11, 11') comprises

at least two upright posts having top ends and bottom ends, the top ends of the at least two upright posts are interconnected by a cross-beam and the at least two upright posts and the cross-beam extend, which generally extends parallel to and along at least a portion of a length of the elongated cylindrical products (2) when palletized, the cross-beam having a greater length than the length of the elongated cylindrical products (2), at least one guide (20, 20'), carried by the cross-beam, for dispensing an interlacing material (12') from at least one spool (12), the bottom ends of the at least two upright posts and the cross-beam extend vertically above and over a gantry base structure (19), and are slidably supported by at least [[a]] two fixed base guide section of the gantry base structure (19) extends (19'), which extend substantially perpendicular to the cross-beam for facilitating movement of the cross-beam along the interlacing device (10, 10'); substantially normal to the at least two fixed base guide sections (19') and the at least one carrier (4) of the palletizing machine (1) the interlacing device (10, 10') also comprises a drive mechanism, which is separate from the operation of the palletizing machine (1) which palletizes the elongated cylindrical products (2), the drive mechanism is connected to the interlacing gantry (11, 11') for displacing the interlacing gantry (11, 11') inside the palletizing machine (1), vertically below the gripping device (5), and relative to the base structure of the interlacing gantry (11, 11') two fixed base guide sections (19'), between at least two alternate end positions so as to displace the at least one interlacing guide (20, 20') in at least one interlacing plane (P), that is essentially perpendicular to the palletized products (2), alternately from one side to another side of the transport pallet (7).

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42. (CURRENTLY AMENDED) The palletizing machine according to claim 41, wherein the at least one interlacing gantry (11, 11') has dimensions that permit the interlacing device (10, 10') to be located within the palletizing gantry (3) of the palletizing machine (1) below the gripping device (5) and outside a length of the cross beam is greater than a length of the transport pallet (7) and the palletized products (2) and smaller than a length of the gripping device.

43. (CURRENTLY AMENDED) The palletizing machine according to claim 41, wherein the gripping device (5') comprises means for controlling a drive mechanism associated with the drive mechanism [[for]] of the palletizing machine (1) in order to displace the interlacing gantry (11, 11') alternately from the one side of the transport pallet (7) to the other side of the transport pallet (7) essentially parallel to the interlacing planes (P) as the palletizing of the products (2) deposited are palletized on the transport pallet (7) progresses and according to a predetermined interlacing pattern.

44. (CURRENTLY AMENDED) The palletizing machine according to claim 41, wherein at least one of the interlacing guides (20') on the interlacing device (10') is associated with activating means (21) designed to displace the at least one of the interlacing guides (20') in alternate translation along the interlacing gantry (11') for a predetermined distance (D) so as to displace the corresponding interlacing plane (P) essentially parallel-to-itself.

45. (CURRENTLY AMENDED) The palletizing machine according to claim 43, wherein the control means are designed to control the activating means (21) for activating the interlacing guide (20') so as to wrap the interlacing material (12') around posts (7') on the transport pallet (7) as palletization of the products (2) progresses and in [[a]] the predetermined interlacing pattern.

46. (CURRENTLY AMENDED) An interlacing device (10, 10') for interlacing a tie material (12') between palletized products (2) deposited by a palletizing machine (1), the interlacing device comprising:

an interlacing gantry (11, 11') extending generally parallel to and along at least a portion of a length of the palletized products (2), the interlacing gantry (11, 11') having at least one interlacing guide (20, 20') supplied with the tie material (12') from at least one spool (12) for facilitating the interlacing of the tie material (12') between the palletized products (2); and

a drive for displacing the interlacing gantry (11, 11') between a first position and a second position and laying the tie material (12') along at least one interlacing plane (P) so as to separate portions of the palletized products (2) from one another;

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wherein the at least one interlacing gantry (11, 11') comprises at least two upright posts (11a) interconnected by a cross-beam (11b) and the at least two upright posts (11a) and the cross-beam (11b) extend generally parallel to and along at least a portion of a length of the products (2), the at least one interlacing guide (20, 20'), carried by the cross-beam (11b), for dispensing an interlacing the tie material (12') from the at least one spool (12), the at least two upright posts (11a) and the cross-beam (11b) extend vertically above and over a gantry base structure (19), and at least a guide section of the gantry base structure (19) extends substantially perpendicular to the cross-beam (11b) for facilitating movement of the cross-beam (11b) along the interlacing device (10, 10'), the drive for displacing the interlacing gantry (11, 11') is independent from any drive of the palletizing machine (1) so that operation of the interlacing gantry (11, 11') does not interfere with operation of the palletizing machine (1), and the drive is coupled to the interlacing gantry (11, 11') for displacing the interlacing gantry (11, 11') is coupled to the interlacing gantry (11, 11') inside the palletizing machine (1) and relative to and along [[to]] the base structure (19) between first and second opposed end positions of the interlacing gantry (11, 11').

47. (CURRENTLY AMENDED) The interlacing device according to claim 46, wherein the interlacing gantry (11, 11') further comprises a pair of posts (11a) interconnected at a top end thereof by a cross-beam (11b) and supporting which supports the at least one interlacing guide (20, 20') for guiding the tie material (12') relative to the palletized products (2) in alternating translation.

48. (CURRENTLY AMENDED) The interlacing device according to claim 47, wherein the interlacing device further comprises at least one chassis (19) equipped with a pathway (18) for guiding the pair of upright posts (11a) interconnected by the cross-beam (11b) (11b) to move relative to the palletized products (2) in alternating translation.

49. (CURRENTLY AMENDED) The interlacing device according to claim 48, wherein the pathway (18) for guiding the pair of upright posts (11a) is formed in the chassis (19) to receive rollers (17) supporting the pair of upright posts (11a).

50. (CURRENTLY AMENDED) The interlacing device according to claim 46, wherein the at least one interlacing guide (20, 20') for guiding the tie material (12') relative to the palletized products (2) in alternating translation in a first direction further comprises an actuator means (21) for moving the interlacing guide (20, 20') relative to the interlacing gantry (11, 11') in alternating translation in a second direction substantially perpendicular to the first direction to wrap the interlacing tie material (12') around a post (7) supporting the palletized products (2).